

## CLAIMS

1. A data management system comprising:-  
a receiver for receiving data access requests for accessing data in a database  
5 system;  
a register configured for storing an identifier for data services in the database  
system and, for each data service identified, first data relating to at least one  
respective data access function implemented by that data service and second data  
relating to data service resources relevant to implementing at least one respective  
10 data access function;  
a comparator for comparing a received data access request including at least  
a data access function requirement and a data service resource requirement with  
respective first and second data to identify data services capable of accessing data in  
accordance with the request; and,  
15 a selector for selecting a data service identified by the comparator for data  
access.
2. A system according to claim 1 wherein the register is further configured for  
storing third data for each data service identified, said third data relating to at least  
20 one data access tariff value relevant to at least one respective data access function.
3. A system according to claim 2 wherein the comparator is further configured  
for comparing a data access tariff requirement in said data access request with said  
third data.
- 25 4. A system according to any one of claims 1 to 3 wherein the selector is  
configured to select a preferred data service according to a pre-determined selection  
strategy.
- 30 5. A system according to claim 4 when dependent on either claim 2 or claim 3  
wherein the selector is configured to select the data service having the lowest data  
access tariff value.

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6. A system according to any one of claims 2 to 5 further comprising an event data recorder for recording event data relating to data service access events.

7. A system according to claim 6 further comprising a billing means for applying relevant data access tariff data to said event data for bill production.

Sub A37

8. A system according to any preceding claim further comprising a connection manager for connecting users issuing data access requests to respective selected data services.

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9. A system according to claim 8 wherein the connection manager comprises a monitor for monitoring the usage of the respective data services.

10. A system according to claim 9 wherein the connection manager further comprises access prevention means for limiting the number of users connected to each respective data service.

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11. A system according to any preceding claim further comprising an interface to the register for user access to data in the register.

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12. A system according to claim 11 further comprising an interface compiler for compiling data in the register for user access.

Sub A57

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13. A distributed database comprising a data management system according to any preceding claim.

14. A method for managing access to data in a database system, the method comprising the steps of:-

storing in a register an identifier for data services provided in a database system and, for each data service identified, first data relating to at least one respective data access function implemented by that data service and second data relating to data service resources relevant to implementing at least one respective data access function;

receiving a data access request for accessing data in the database system, the request including at least a data access function requirement and a data service resource requirement;

comparing the received data access request with respective first and second  
5 data to identify data services capable of accessing data in accordance with the request; and,

selecting a data service identified by the comparison for data access.

15. A method according to claim 14 further comprising the step of storing third  
10 data for each data service identified, said third data relating to at least one data access tariff value relevant to at least one respective data access function.

16. A method according to claim 15 further comprising the step of comparing a data access tariff requirement in said data access request with said third data.

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*Sub A67* 17. A method according to any one of claims 14 to 16 wherein the data service is selected according to a pre-determined selection strategy.

18. A method according to claim 17 when dependent on either claim 15 or claim  
20 16 wherein the strategy comprises the step of selecting the data service having the lowest data access tariff value.

19. A method according to any one of claims 15 to 18 further comprising the step of recording event data relating to data service access events.

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20. A method according to claim 19 further comprising the step of applying relevant data access tariff data to said event data for bill production.

*Sub A77* 21. A method according to any one of claims 14 to 20 further comprising the  
30 step of connecting a user issuing a data access request to a respective selected data service.

SubA7  
22. A method according to any one of claims 14 to 21 further comprising the step of monitoring the usage of the respective data services.

23. A method according to any one of claims 14 to 22 further comprising the  
5 step of limiting the number of users connected to each respective data service.

24. A method according to any one of claims 14 to 23 further comprising the step of providing user access to the stored first second and third data.

10 25. A method according to claim 24 further comprising the step of compiling the stored data for user access.

SubA8  
15 26. A method according to any one of claims 14 to 25 wherein the resource data comprises data from the group comprising:- data service response time, data accuracy, data correctness and time since last data update.

27. A method according to any one of claims 14 to 26 wherein the method is implemented in an object orientated software environment.

20 28. A method according to claim 27 wherein the step of storing data in the register comprises the step of publishing respective object orientated message interfaces using a communication protocol language.

29. A data management system comprising:-  
25 a receiver for receiving data access requests for accessing data in a database system;

a register configured for storing an identifier for respective data services in the database system and, for each data service identified, first data relating to at least one respective data access function implemented by that data service and  
30 second data relating to at least one data access tariff value relevant to at least one respective data access function;

a comparator for comparing a received data access request including at least a data access function requirement and a data access tariff requirement with

respective first and second data to identify data services capable of accessing data in accordance with the request; and,

a selector for selecting a data service identified by the comparator for data access.